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What is claimed is:

1. An antimicrobial lens comprising a coated zeolite.

2. The antimicrobial lens of claim 1, wherein the zeolite is coated with a composition comprising at least one silane.

3. The lens of claim 2 wherein the coated zeolite comprises silver.

4. The lens of claim 2 wherein the lens is a contact lens.

5. The lens of claim 2 wherein the silane comprises a composition of Formula I.

$$R^1_n\text{–Si-}(OR^2)_{4-n}$$

I

wherein

R^1 is C_{1-20}alkyl, C_{1-8}alkenyl, phenyl, phenylC_{1-8}alkyl, haloC_{1-8}alkyl, fluoroC_{1-8}alkyl, C_{1-8}alkoxycarbonylC_{1-8}alkyl, or C_{1-8}alkylsiloxy;

R^2 is C_{1-6}alkyl, C_{1-8}alkenyl phenyl, phenylC_{1-8}alkyl, haloC_{1-8}alkyl, or C_{1-8}alkoxycarbonylC_{1-8}alkyl; and

n is 1-3.

6. The lens of claim 5 wherein R^1 is C_{10}alkyl.

7. The lens of claim 5 wherein R^1 is C_{18}alkyl.

8. The lens of claim 5 wherein R^1 is C_8alkyl.

9. The lens of claim 5 wherein R^2 is C_{1-3}alkyl.

10. The lens of claim 2 wherein, the silane comprises a composition of

Formula II

$$R^1_n - Si\text{-}(X)_{4-n}$$

II

wherein

R^1 is $C_{1\text{-}20}$alkyl, $C_{1\text{-}8}$alkenyl, phenyl, phenyl$C_{1\text{-}8}$alkyl, halo$C_{1\text{-}8}$alkyl, fluoro$C_{1\text{-}8}$alkyl, $C_{1\text{-}8}$alkoxycarbonyl$C_{1\text{-}8}$alkyl, or $C_{1\text{-}8}$alkylsiloxy;

X is any group that can be displaced with a nucleophile; and

n is 1-3.

11. The lens of claim 10 wherein X is selected from the group consisting of is chloro, bromo, iodo, acyloxy, hydroxyl, and NH-Si$(CH_3)_3$.

12. The lens of claim 10 wherein R^1 is C_{10}alkyl.

13. The lens of claim 10 wherein X is acyloxy or chloro.

14. The lens of claim 10 wherein R^1 is C_{18}alkyl.

15. The lens of claim 2 wherein the silane is selected from the group consisting of phenyltrimethoxysilane, phenyltriethoxysilane, diphenyldimethoxysilane, diphenyldiethoxysilane, methyltrimethoxysilane, methyltriethoxysilane, methyltripropoxysilane, ethyltrimethoxysilane, ethyltriethoxysilane, ethyltripropoxysilane, propyltrimethoxysilane, propyltriethoxysilane, propyltripropoxysilane, butyltrimethoxysilane, butyltriethoxysilane, hexyltrimethoxysilane, hexyltriethoxysilane, benzyltrimethoxysilane, octyltrimethoxysilane, octyltriethoxysilane, octyltripropoxysilane, decyltrimethoxysilane, dodecyltrimethoxysilane, octadecyltrimethoxysilane, tetradecyltrimethoxysilane, tetradecyltriethoxysilane, hexadecyltrimethoxysilane, hexadecyltriethoxysilane, dimethyldimethoxysilane, dimethyldiethoxysilane,

dibutyldimethoxysilane, octadecylmethyldimethoxysilane, octadecyldimethylmethoxysilane, acetoxypropyltrimethoxysilane, octadecyltrichlorosilane, trifluoropropyltrimethoxysilane, perfluorodecyl-1H,1H,2H,2H-dimethylchlorosilane, N-(2-aminoethyl)-3-aminopropyltrimethoxysilane, and 3-aminopropyltrimethoxysilane.

16. The lens of claim 2 wherein the silane is selected from the group consisting of octadecyltrimethoxy silane, octyltrimethoxysilane, butyltrimethoxysilane, octadecyltrichlorosilane, and acetoxypropyltrimethoxysilane.

17. The lens of claim 2 wherein the silane is octyldecyltrimethoxysilane.

18. The lens of claim 2 having
more than about 0.02 weight percent coated zeolite, and
less about 1.0 weight percent coated zeolite.

19. The lens of claim 2 having
more than about 0.025 weight percent coated zeolite, and
less about 0.1 weight percent coated zeolite.

20. The lens of claim 2 having
more than about zero weight percent coated zeolite, and
less than about 0.1 weight percent coated zeolite.

21. The lens of claim 17 having
more than about zero weight percent coated zeolite, and
less than about 0.1 weight percent coated zeolite.

22. The lens of claim 17 wherein the coated zeolite comprises silver.

23. The lens of claim 2 wherein the coated zeolites comprise at least two different compositions of Formula I.

24. The lens of claim 2 wherein the coated zeolites comprise at two different compositions of Formula II.

25. The lens of claim 2 wherein the coated zeolites comprise at least one compositions of Formula I, at least one compositon of Formula II or mixtures thereof.

26. The antimicrobial lens of claim 1 wherein the zeolite is coated with a composition comprising at least one hydrophobic monomer.

27. The lens of claim 26 wherein the hydrophobic monomer is selected from the group consisting of perfluoropropylene oxide, diethylene glycol vinyl ether, methyl methacrylate, lauryl methacrylate, styrene, 1,3-butadiene, propylene glycol, hexamethylcyclotrisiloxane, and mixtures thereof.

28. The lens of claim 26 wherein the hydrophobic monomer is selected from the group consisting of perfluoropropylene oxide, diethylene glycol vinyl ether and mixtures thereof.

29. The lens of claim 26 having
more than about 0.02 weight percent coated zeolite, and
less about 1.0 weight percent coated zeolite.

30. The lens of claim 26 having
more than about 0.025 weight percent coated zeolite, and
less about 0.1 weight percent coated zeolite.

31. The lens of claim 26 having
more than about zero weight percent coated zeolite, and
less than about 0.1 weight percent coated zeolite.

32. A method of reducing the adverse effects associated with microbial

infections in the ocular regions of a mammal comprising placing an antimicrobial lens comprising a coated zeolite on the eye of a mammal.

33. The method of claim 32 wherein the adverse effect is contact lens acute red eye.

34. The method of claim 32 wherein the mammal is a human.

35. A method of producing an antimicrobial lens comprising a coated zeolite where the method comprises the steps of

(a) coating a zeolite with a silane or with a hydrophobic monomer to produce a coated zeolite

(b) adding the coated zeolite of step (a) to a lens formulation prior to curing said lens formulation.

36. A method of producing an antimicrobial lens comprising a coated zeolite where the method comprises, the steps of

(a) coating a zeolite containing a non-antimicrobial metal with a silane or a hydrophobic monomer to form a coated zeolite;

(b) adding the zeolite of step (a) to a lens formulation prior to curing said lens formulation;

(c) curing the lens formulation to produce a lens and

(d) treating the lens of step (d) with an solution containing soluble salts of an antimicrobial metal.

37. The method of claim 36 wherein the non-antimicrobial metal is sodium, potassium, or calcium.

38. The method of claim 36 wherein the solution is about 20% silver nitrate in deionized water.

39. A method of coating a zeolite with a silane comprising contacting the zeolite with the silane at a pH of about greater than 4 and about less than 5.5.

40. A method of coating a zeolite with a silane comprising contacting the zeolite with a silane at a pH of about greater than 10 and about less than 12.

41. An antimicrobial lens comprising silver wherein the lens has sufficient movement on the eye of a patient, provided that the lens does not contain un-coated zeolites having a diameter of greater that 200 nm.

42. The lens of claim 41 having about 50 to about 100 percent movement.

43. The lens of claim 41 having about 75 to about 100 percent movement.

44. The lens of claim 41 having about 90 to about 100 percent movement.

45. A method of preparing an antimicrobial lens comprising heating a lens with a silver containing solution.

46. The method of claim 45 wherein the lens is heated at about 40 to about 140 °C.

47. An antimicrobial lens comprising silver and an oxidizing agent.

48. The lens of claim 47 wherein further comprising a silver zeolite.

49. The lens of claim 47 wherein the oxidizing agent is hydrogen peroxide.

50. A method of reducing discoloration in an antimicrobial lens comprising contacting said antimicrobial lens with an oxidizing agent.

51. An antimicrobial lens comprising nano-sized zeolites.

52. The lens of claim 51 wherein the nano-sized zeolites have a diameter of about 50 nm to about 150 nm.